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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/694,074	10/27/2003	Nathan R. Belk	073670.0183	3795

5073 7590 12/21/2006  
BAKER BOTTS L.L.P.  
2001 ROSS AVENUE  
SUITE 600  
DALLAS, TX 75201-2980

EXAMINER
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YENKE, BRIAN P

ART UNIT	PAPER NUMBER
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2622

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	12/21/2006	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

**Office Action Summary**

Application No.

10/694,074

Applicant(s)

BELK, NATHAN R.

Examiner

BRIAN P. YENKE

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on Amendment (11 Oct 06).
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-8, 10, 11, 26 and 27 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-8, 10, 11, 26 and 27 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_.
- ☐ Notice of Informal Patent Application
- ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Response to Arguments***

1. Applicant's arguments filed 11 Oct 06 have been fully considered but they are not persuasive.

#### ***Applicant's Arguments***

- a) Applicant states that the examiner states that the pre-select filter and tuner are on the same chip, however does not in any way address how undesired channels are dissipated.
- b) Applicant traverses the examiner's rejection pertaining "the filter comprises a plurality of stages and is switchable among the plurality of stages".
- c) Applicant states that Waight does in fact describe the components used in the pre-select filter which is different from the claimed invention.

#### ***Examiner's Response***

- a) The examiner in light of the applicant's specification, rejected the limitation using applicant's disclosure, which stated that by placing a prefilter/filter on the same chip as the tuner, dissipates the undesired channels from being reflected back to the transmitter. Thus since Waight discloses that the prefilter is prior to the tuner and that the entire receiver can be placed upon a single chip---would then derive the same results. If the applicant's disagrees with this assertion, the examiner would like the applicant to clarify how the applicants invention being on a single chip overcomes the prior art which aren't on a single chip, while being different than Waight which is on a single chip.

b) It is noted that the filter of Waight discloses the two stages (meeting the plurality), wherein the stages are switchable based upon selecting the UHF band or VHF band, meeting the language of claim 3.

c) The examiner agrees that Waight's preselector is different in design, however the concept of using various components in a serial/parallel fashion are all conventional design options available to the user, as shown by Waight which discloses such design in the tracking filters. Why would Waight implement such design in the prefilter? The most obvious reason would be to isolate the frequency from the unwanted frequency components by only selecting/activating the desired components. In the preselector, Waight switches between inductive elements, wherein in the tracking filter, capacitors elements are selectively activated (Fig 5).

### ***Claim Rejections - 35 USC § 102***

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-3, 7-8, 11 and 26-27 rejected under 35 U.S.C. 102(e) as being anticipated by Waight et al., US 2005/0024544.

In considering claims 1, 3, 8, 11 and 26,

a) the claimed filter...is met by pre-select filter 202 (Fig 2) which receives an RF input and rejects a particular band of channels and transmits this intermediate signal (signal with less channels than that received into 202) to gain 204 and to subsequent selection 208 (of tuner 208). Waight discloses that all the components may be place on the same chip or variations thereof (para 0058).

b) the claimed tuner...is met by subsequent selection 208 (of tuner 208) which receives a 2<sup>nd</sup> of channels via pre-select 202 and further provides a intermediate signal comprising a third reduced number of channels via selection of filter 240, 242, 244 or 246.

In considering claim 2,

The claimed first number of channels being greater than 100 is met by a receiver, which can receive at least UHF/VHF frequency signals and other signals broadcasted in the other (satellite, cable etc.....). The second number of channels less than forty is met where in rejecting the VHF band would be less than 40 channels. Regarding the third number being less than three, Waight discloses that the number can be reduced to a group of channels or a single selected channel (being less than 3).

In considering claims 7 and 27,

Waight discloses the filters may be channels of a frequency from 50 to 878 MHz (para 0023).

### ***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 4-6 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Waight et al., US 2005/0024544.

In considering claims 4-6,

Waight does however, illustrated such features for the tracking filters (i.e. 240, 242, 244 and 246), wherein the filters comprise the connection of capacitors in series and parallel with an inductor (Figs 3-4) where the system is controlled using controller 224.

Thus the concept of a capacitor/inductor configuration in the rejection of channels bands is conventional in the art, and the examiner maintains it would have been clearly obvious to one of ordinary skill in the art to utilize this concept in the first pre-select filter, since the logic/design would provide the system the same desired results in filtering the signals using similar technology/components.

In considering claim 10,

Waight does not explicitly recite the use of a LPF prior to the preselect filter. However, the use of LPF in rejecting/eliminating unwanted noise from a receive signal is notoriously well known and thus the examiner takes "OFFICIAL NOTICE" regarding as such, since the use of a LPF provides the receiver a cleaner/noise-free signal to process.

### ***Conclusion***

4. The examiner would like the applicant to clarify the distinctiveness between the applicant's invention and that of the search report (PCT/US 2004/032853) filed with 09 Feb 05 (PTO-1449).

5. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Brian Yenke whose telephone number is (571)272-7359. The examiner work schedule is Monday-Thursday, 0730-1830 hrs.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's Supervisor, David L. Ometz, can be reached at (571)272-7593.

**Any response to this action should be mailed to:**

Commissioner of Patents and Trademarks

Washington, D.C. 20231

**or faxed to:**

**(571)-273-8300**

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is  
(703)305-HELP.

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(FAX) 703-305-7786

(TDD) 703-305-7785

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For other technical patent information needs, the Patent Assistance Center can be reached through customer service representatives at the above numbers, Monday through Friday (except federal holidays) from 8:30 a.m. to 5:00 p.m. EST/EDT.



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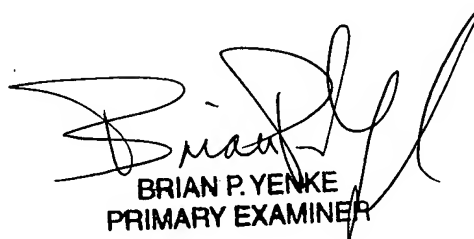
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B.P.Y

14 December 2006



BRIAN P. YENKE  
PRIMARY EXAMINER